DOCUMENT RESUME

ED 242 606 SO 015 506

AUTHOR Lambert, Vicki; Rohland, Grace
TITLE The Feasibility of Teaching about Sex-Role Stereotyping in a Pre-Service Teacher Training Setting: A Pilot Study.
PUB DATE Nov 83
NOTE 34p.; Paper presented at the Annual Midyear Conference of the American Educational Research Association Research on Women and Education Special Interest Group (9th, Tempe, AZ, November 1983).
PUB TYPE Reports - Research/Technical (143) -- Speeches/Conference Papers (150)

EDRS PRICE MF01/PC02 Plus Postage.
DESCRIPTORS *Educational Needs; Educational Practices; Educational Research; Elementary Secondary Education; Females; Higher Education; Knowledge Level; Males; *Preservice Teacher Education; Sex Bias; Sex Differences; Sex Discrimination; Sex Role; *Sex Stereotypes; Teaching Methods

ABSTRACT

The purpose of this study was to gauge the need for teaching preservice teachers about sex stereotyping and to determine whether a general or specific teaching approach would be more effective. The sample consisted of 50 students from two sections of a core teacher-training course at the University of Utah. Information about stereotyping was presented to one class, using very general information. The second class was taught about one form of stereotyping, sexism; the lesson content was presented, using very specific materials. The data showed a need for teaching preservice teachers about stereotypes. Eighty percent of the students indicated that the classes did add to their knowledge and understanding of stereotyping. Of the two approaches used, the specific approach seemed most useful. Since students start on a higher level of awareness, it is more beneficial to take issues that have already been identified, and probe deeper into their causes. The study concludes with a description of a three-part approach to a reorganization of methodology to insure preservice teachers are receiving the optimal level of benefit in sex-role stereotyping education. (RM)

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TO THE EDUCATIONAL RESOURCES INFORMATION CENTER (ERIC)."

THE FEASIBILITY OF TEACHING ABOUT SEX-ROLE STEREOTYPING IN A PRE-SERVICE TEACHER TRAINING SETTING: A PILOT STUDY

SO 015 506

A Paper Presented at the Annual AERA-SIG Mtg.

Vicki Lambert

Grace Rohland

November, 1983

DEPARTMENT OF EDUCATIONAL STUDIES
UNIVERSITY OF UTAH

Overview

A recent documentation by Myra and David Sadker, that sex-role stereotyping still exists in the classroom, prompted this pilot study. Current national concern about the low number of college students enrolling in science and mathematics education programs may be reflective of the subtle forms of stereotyping that have been operating as "hidden lessons" in our schools.

The fact that teachers' actions can, and still do, affect student expectations for success caused concern that surfaced in the form of two questions. Do pre-service teachers in Utah need to be taught about stereotypes? Is there a "best" way to teach about stereotypes?

This pilot study assessed the need to educate students preparing for Utah Teacher Certification about stereotyping. Students from two sections of a core teacher-training course provided the population for trying two approaches to teaching about stereotypes. The first method was to teach students about common forms of stereotyping using general information for each area. The alternate method was an in-depth approach which focused directly on one specific form of stereotyping, sexism, and used very explicit materials and data to present information. Pre and post tests were administered to assess changes that occurred as a result of the learning experience. An evaluation form was administered in conjunction with the post-test to rate student attitudes concerning stereotypical issues and to guage presentation preferences.

Although pre/post test results did show a gain in knowledge about

stereotypes, the evaluation form revealed that students possessed a higher level of awareness about both general and sex-role stereotyping than originally anticipated. For this reason, a more specific and in-depth approach is recommended.

Starting with an increased level of awareness will allow more depth in studying about causes, perpetuation actions and problem solving techniques for stereotypical issues in teacher-training courses. Increased depth will provide the heretofore neglected and overlooked essential element needed to begin to effectively eradicate the hidden curriculum which separates, segregates, and tracks women into traditional coursework and into traditional careers.

The authors recommend a three-based approach to educating pre-service teachers about stereotyping issues. When implemented, such an approach will cover all aspects necessary, and result in a winning "home-run" strategy for creating a more global perspective in pre-service, future teachers.

Introduction

Many overt and subtle factors result in the sorting, grouping, and tracking of female students in stereotyped patterns that prepare them to accept traditional roles and jobs in adult life, rather than to explore all options and opportunities according to their individual talents and interests.

These subtle influences on students are part of the unplanned, unofficial learning that students absorb as they move through school - the hidden curriculum. This curriculum includes the messages children receive about themselves and others of their sex through illustrations, language, and content of textbooks, films, and visual displays, the way in which administrators, teachers, and other students interact with them, the part they play in important school rituals, and the extent to which they come in contact with influential role models of their own sex and race.

As educators, our role is to ensure that students break out of group stereotypes to explore and pursue a wide variety of options in school and life. But in order to provide this freeing influence, we must be aware of the blatant, as well as the subtle, socializing factors which influence the students in the classrooms (Sadker and Sadker, 1982).

If teachers are not fully aware of the subtle as well as the blatant ways in which women are oppressed - if women teachers themselves, having been formed by an educational system oppressive to women, since it incorporates every male myth about women, are not aware of their own oppression - they will continue to mirror society's women-negating attitudes. Our girl

children, then, will be victims of their teachers' inertia, and of their teachers' unexamined realities (Harrison, 1973).

The Growing Crisis

Recently, a high degree of interest has been expressed by policy makers, business leaders, and educators regarding science and mathematics education at the intermediate and high school level. Particularly during the past year, concern has been raised about the low number of college students enrolling in science and mathematics education programs, the large number of experienced math and science teachers who are leaving education to work in business and industry, and the limited number of high school students completing advanced science and mathematics course work (Guthrie, Ward, & Barker, 1983). Of particular concern should be the fact that a disproportionately low number of females comprise the group of which such concern is being generated.

Numerous studies have shown that math and science serve as critical filters that exclude many women from higher paying jobs (Sells, 1976). According to a recent report by the National Science Foundation, females were over forty percent of all professional and related workers in 1978 but they comprised only 9.4 percent of the scientists and engineers. Representation varied by field, with women holding twenty percent of the labor market in psychology down to only two percent in engineering and physics. Because mathematics and science are prerequisites for many college majors, limited background in these areas effectively precludes women from entering

numerous career areas which include, but are not limited to, those in science and math (Parson, Heller, & Kaezala, 1980).

Compared to boys, girls elect reduced participation in science, and particularly in mathematics, as soon as that option is available to them in high school. One factor that has been shown to influence course selection has been one's expectancy for success (Parsons, Kaezala, Goff, Karabenick, Heller, and Meece, 1979). And one's expectancy for success has been shown to be directly influenced by sex-role stereotyping techniques which occur in the classroom prior to, and including high school (Parson, Heller, & Kaezala, 1980). It could be said that sex-role teaching practices are the "critical filters" to coursework selection.

Sex-Role Biasing in the Classroom

Reviewing the literature, numerous examples of the ways in which boys and girls are stereotyped into traditional roles are found. Many of these are overt, but many more are covert. For simplification purposes of this paper, a list of the methods documented in the classroom follows.

Blatant Techniques:

* Readers, novels, and textbooks often present a stereotyped view of male and female roles (Stoddard, Schmuck, Kempner, Willimas, Edson, & Smith, 1980). Women may be shown as sociable, kind, timid, inactive, unambitious, and unassertive. A study of school readers (Sexton, 1976) showed that seventy-three percent of the central characters were male. Early childhood readers celebrate stereotypical nuclear-family roles, where mothers and girls stay home and clean, fathers go off to work, and boys have adventures (Harrison, 1979). Buford Steflire's study in "Run Mama Run: Women Workers in Elementary Readers" says that presentation of women is unrealistic: women are depicted as not working outside the home, or, if she does work, she is portrayed as nonmarried and professional (Sexton, 1976).

  Jamie Kelem Frisof reports in "Textbooks and Channeling" that there

is not an accurate portrayal of women in elementary social studies textbooks. A study by Janice Law Trecker found the same inaccurate portrayal in United States History high school texts - men's activities and goals are presented as history and women who conform to the female stereotype are included as supplemental materials (Sexton, 1976). Women's place in history has traditionally been ignored, thus depriving students of both female role-models and the sense of the texture of daily life (Sexton, 1976; Harrison, 1979).

Library books reflected overwhelming "maleness" in children's books: "Boys celebrate life by living it fully and reaching out to the world, and girls reach out to boys." The books had stereotypical nuclear families in which mothers and girls stay home and clean, fathers go to work, and boys have adventures (Harrison, 1973).

In "Women in Children's Literature," Alleen Pace Nielsen reports that she found in elementary picture books "the cult of the apron" and the image of the female ranging "from dull to degrading to invisible." She lists possible reasons for this:(a)sex-bias of the English language, (b)large number of male illustrators, (c)the orientation of books to boys, and (d)use of folktales which depict men as doers and women as onlookers (Sexton, 1976).

* Single-sex courses such as "Powder-Puff Football," "Bachelor Cooking," etc., perpetuate sex stereotypes (Sadker & Sadker, 1982).

* Counseling often sets girls and boys in stereotyped tracks, disregarding their individual abilities (Sadker & Sadker, 1982).

* Girls' physical education programs receive howhere near the kind equipment, facilities, staff, benefits, publicity, or money that boys' sports receive (Sadker & Sadker, 1982).

* Extracurricular activities have provided experience and skills that reinforce basic assumptions about appropriate female and male roles, jobs, and behavior. Boys' activities have been oriented to develop creativity, leadership, and physical prowess (athletics, science competitions, chess clubs, etc.). Girls' activities were designed to develop domestic skills and focused on ehlping or serving others: cheerleading, future-teachers, future-homemakers, etc. (Sadker & Sadker, 1982).

* Sex-role stereotyping appears in testing materials - standardized tests as well as classroom tests. One study showed tests to contain fourteen times as many references to males as to females, with sex-role stereotyping. Subjects of sentences often took the form of the masculine pronoun (Stoddard, et al, 1980).

* In the elementary school, teachers are more likely to be women,

principals to be men. In 1971, although women comprised eighty-eight percent of elementary school teachers, they only accounted for twenty-two percent of the elementary school principals (Stoddard, et al, 1980; Fader, Duggins, Finn, & McNeil, 1976). In the junior high, principals are still likely to be men, and although there are more male teachers in junior high than in elementary school, they tend to teach subjects like math and science, while women teach English and foreign languages (Stoddard, et al, 1980).

Subtle Techniques:

* Boys receive more attention from their teachers: they receive three times more reprimands, even when their behavior is the same (Sadker & Sadker, 1982; O'Leary, Kent, & Tonick, 1973).

* Boys are exhorted to be good and smart and docile and obedient, but often with the attitude that "boys will be boys" (O'leary, et al, 1973).

* Boys are reprimanded more for misbehavior, while girls are more likely to be criticized for academic performance (Sears & Feldman, 1974; Stoddard, et al, 1980).

* When teachers criticize students they more often use a harsh or angry tone of voice for boys and a normal voice for girls (Sexton, 1976).

* Boys receive more praise for academic performance, while girls are praised for neatness, politeness, and appearance, which is often referred to as the "cinderella syndrome" (Harrison, 1973; Stoddard, et al, 1980).

* Teachers tend to give boys both more negative and more positive feedback (Classroom Climate, 1981).

* Questions are directed toward boys more often than girls (Stoddard, et al, 1980; Classroom Climate, 1981).

* Teachers ask boys more direct questions, more open-ended questions, and more complex and abstract questions (Classroom Climate, 1981; Sadker & Sadker, 1982; Harrison, 1973; Stoddard, et al, 1980).

* Although girls volunteer significantly more often than boys, they are called upon less often (Stoddard, et al, 1980).

* Teachers give more approval, direct instruction and attention by listening boys (Classroom Climate, 1981; Sadker & Sadker, 1982; Harrison, 1979; Sears & Feldman, 1974; Stoddard, et al, 1980).

* Boys are rewarded more for creative behavior (Sears & Feldman, 1974; Stoddard, et al, 1980).

* Teachers may encourage boys to think for themselves, while supplying girls quickly with answers to their questions (Classroom Climate, 1981).

* Teachers do not give girls as much informal feedback and encouragement for their academic efforts (Classroom Climate, 1981).

* Girls are interrupted more often than are boys, by both peers and teachers (Classroom Climate, 1981).

* Teachers tend to make more eye-contact with boys when they ask a question to the class as a whole, thus recognizing boys and inviting responses from them (Classroom Climate, 1981).

* Teachers may assume that girls are uncertain about what they want to say because girls may state their classroom comments hesitantly, or in "overly polite" fashion (Classroom Climate, 1981).

* Tasks and groupings are often based on appropriate female and male behavior, such as boys being asked to carry books, move furniture, operate audiovisual equipment, or girls being asked to carry messages and erase the boards (Classroom Climate, 1981; Sadker & Sadker, 1982).

* Teachers learn the names of boy students sooner than the names of girls in their classes (Fader, et al, 1976).

* Separation of toys, particularly in kindergarten, results in a stereotyping of boys' and girls' play (Sexton, 1976; Harrison, 1979).

* Teachers habitually use examples with a male as the professional and a female as the client or patient, thus making it difficult for women to imagine themselves in professional roles (Classroom Climate, 1981).

* Some teachers give boys a better grade than girls for the equivelant amount of work (Nieva & Gutek, 1980).

* Teachers sometimes attribute males' success to skill or ability but females' success to luck or lack of difficulty of the task to be performed (Frey & Slaby, 1979).

* Teachers expect less of females, thus initiating a self-fulfilling prophecy (Frey & Slaby, 1979; Sadker & Sadker, 1982).

* Teachers talk to boys regardless of their location in the room, but only to girls who are nearby (Classroom Climate, 1981).

* Teachers make eye contact more often with boys than with girls (Classroom Climate, 1981).

* Teachers may nod and gesture more often in response to boys' questions and comments than to girls' (Classroom Climate, 1981).

* Teachers may assume a posture of attentiveness when boys speak, but the opposite when girls make comments (Classroom Climate, 1981).

* Teachers may assume a posture of attentiveness when boys speak, but the opposite when girls make comments (Classroom Climate, 1981).

* Teachers may habitually choose a location near male students (Classroom Climate, 1981).

* Teachers may allow girls to be physically "squeezed out" from viewing a laboratory assignment or demonstration (Classroom Climate, 1981).

* Teachers may encourage girls to show emotions, such as when reading a novel, but make comments like, "Big boys don't cry" to the boys (Harrison, 1973).

In a recent validation study conducted by Drs. David and Myra Sadker of American University in Washington D.C., observers were sent to one-hundred classrooms in five states to sit in on classes. The result: beginning with nursery school, through the early grades and beyond, "teachers unwittingly favor male students over female students," through many of the techniques described above. Many teachers say they teach children equally, yet when their classrooms are videotaped, they are surprised to discover their sex stereotyping actions (Safran, 1983).

This Study

Teaching techniques appear to perpetuate and solidify traditional sex roles, acting as critical filters in girls' enrollment into science and mathematics courses, thus continuing the dual travesty of precluding women from many career options and prohibiting society from partaking of the

much needed personnel in these fields. The Sadkers make two major recommendations towards eradication of sex-role stereotyping in educational settings: one is to create awareness of the problem and its importance to our present needs; the other is to move sex equity from the periphery of teacher preparation to its mainstream (1980).

This pilot study was undertaken to meet both of these recommendations made by the Sadkers. It was also an intent to determine if a need exists to teach pre-service and service teachers about stereotyping and to determine if a more general or a more specific approach would be most effective.

METHODOLOGY OF THE STUDY

Sampling, Background Information, and Instrumentation

The population for this pilot study was composed of matriculated university students from two sections of the Educational Studies course #541, Teaching Minority Students, taught at the University of Utah. The course is part of a core curriculum required for certifying teachers in Utah. Data used for this report were gathered from four class sessions (two per class). In general, class membership consisted of junior or senior level students enrolled in the teacher training program. However, the course is also taken as an elective by students in programs other than the pre-service certification track. The sample for this study included fifty students, twenty-five from each class. Pre-tests, post-tests, and evaluation forms were used in both classes. Of the fifty who took the pre-tests, thirty five returned to complete the post-tests and evaluation forms. The majority of the students who participated were preparing for Utah certification. A description of student status, age, and sex can be found under the Data An-

alysis section of this paper. The subject content used in the study was divided so the instructors would teach the same part to each class.

Classroom conditions, materials, time allowed for instruction (ninety minutes each class), assignments, pre and post-tests were identical. The data were collected after each class session by the authors and with assistance from the assigned course professor.

To meet the purposes of the pilot study as outlined above, information was presented to each class about stereotyping using two different styles. The first approach was to teach students about common forms of stereotyping, using general information for each area. This was accomplished by presenting a lecture-discussion format which used a film for background information. A homework exercise was assigned that asked students to identify a sexist policy or practice they had encoutered in school, to identify forces for or against that policy practice, and to identify steps for change. This homework exercise became the introduction for the second session which used a more specific approach. The alternate method was to teach students directly about one form of stereotyping, sexism, and to present the lesson content using very specific materials and data. This was accomplished by first discussing the homework in small groups and summarizing the information as a class. The issue of sexism was then discussed using particular and detailed examples to illustrate the more subtle forms sex-role stereotyping can take.

Pre-tests were given to each class section at the beginning of the first class session to assess student familiarity and understanding of the concepts related to stereotyping. The post-test was administered at the conclusion

of the second session to assess any changes that occurred as a result of the learning experience. The pre and post tests were the same and contained fifteen questions designed to assess response ranging from 1 (poor) to 5 (superior). An evaluation form was administered in conjunction with the post-test to rate student responses to the classes, to assess student attitudes concerning stereotypical issues (particularly those of sexism), and to gauge presentation preference. All instruments appear in the appendix. Demographic information was included as part of the pre-test measure.

Data Analysis

A. Pre/Post Results:

Of the fifty students who responded to the pre-test (twenty-five from each class), sixteen were male, thirty-four were female. Thirty-three were between ages 20 - 29, fifteen were between ages 30 - 39, and two were between ages 40 - 49. Forty-one were pre-service teachers, three were contemplating teaching, two were already teaching, one was an administrator, and three considered themselves as "others."

Of the thirty-five students who returned to complete the post-test, twelve were male, twenty-three were female. Twenty-six were between ages 20 - 29, eight were between ages 30 - 39, one was between ages 40 - 49. Twenty-nine were pre-service teachers, one was contemplating teaching, two were already teaching, and two considered themselves as "others." Table 1 provides an overview of these results.

There was an increase in all scores from the pre to the post test. The average score for all pre-test items was 2.8; the average score for all post-test items was 3.6, indicating a .71 total increase. Four questions,

TABLE 1
Demographics
Pre/Post Tests

	Number Responding	
SEX:	Pre-Test	Post-Test
MALE	16	12
FEMALE	34	23
AGE:		
20-29	33	26
30-39	15	8
40-49	2	1
STATUS:		
Pre-service	41	29
Contemplating Teaching	3	1
Presently Teaching	2	2
Administration	1	0
Other	3	2

items 2, 3, 12, and 13, showed an increase of more than one point. The least average gain (.2) was evidenced in item 11. The slight gain, however, does not tell the entire story. A closer look at the individual scores on this item reveals that students did move upwards in each step of the rating scale. While six felt their abilities were "poor" in indentifying subtle stereotyping forms initially, none felt their abilities to be "poor" by the conclusion. The majority of the final responses fell into the "good" or "superior" range. Table 2 outlines individual and average ratings to all pre/post test items.

B. Evaluation-Form Results

The first question on the evaluation form asked students to rate the value of the classes on stereotyping. Based on a Likert-type scale of 1 (low) to 10 (high) the average score for the first class was 6.77; the average score for the second class was 7.06; the average overall rating for both classes was 7.12.

Eighty percent of the students who completed the post-test felt positively that the classes contributed to their understanding of stereotyping: fourteen percent felt they had not; six percent felt they had contributed "somewhat."

Eighty-nine percent felt the information presented in class would influence their future behavior, and further agreed that the subtle forms of sex-role stereotyping should become an awareness issue for students grades K - 12. Ninety-four percent felt that all teachers grades K - 12 should be sure to acquire knowledge of the subtle forms of sex-role sociali-

TABLE 2
PRE/POST TEST DATA

QUESTIONS I am able to:	Test	RESPONSES Poor 1	2	3	4	5 Superior	Question Averages	Average Increase
1. Explain the concept of stereotyping.	Pre	0	11	23	14	2	3.14	.88
	Post	0	0	5	24	6	4.02	
2. Distinguish among stereotyping, halo effect, projection, expectancy, and prejudice.	Pre	5	21	15	8	1	2.58	1.10
	Post	0	2	11	16	4	3.68	
3. Present a defensible rationale for stereotyping.	Pre	13	19	11	4	2	2.00	1.14
	Post	2	4	12	17	0	3.14	
4. Identify three major causes of stereotyping.	Pre	8	11	17	12	2	2.98	.90
	Post	0	0	10	19	6	3.88	
5. Identify and consider several consequences of stereotyping.	Pre	0	9	21	17	3	3.30	.84
	Post	0	0	6	18	11	4.14	
6. Distinguish when stereotyping becomes dangerous.	Pre	0	12	18	18	2	3.20	.82
	Post	0	0	4	21	9	4.02	
7. Determine several courses of action to "cure" the practice of negative stereotyping.	Pre	5	14	12	6	3	2.56	.95
	Post	0	3	12	19	1	3.51	
8. Recognize sexist attidues and behaviors.	Pre	1	5	21	21	2	3.36	.66
	Post	0	1	5	21	8	4.02	
9. Understand the concept of sex-role stereotyping.	Pre	1	7	21	18	2	3.20	.94
	Post	0	0	7	16	12	4.14	
10. Identify 5 blatant means of perpetuating SRS in the classroom.	Pre	4	18	16	10	2	2.76	.66
	Post	0	1	9	17	8	3.42	
11. Identify at least 10 subtle means of SRS in the classroom.	Pre	6	21	12	8	3	2.62	.20
	Post	0	2	9	7	9	2.82	
12. Clarify my own thinking about SRS in the classroom.	Pre	4	13	15	17	1	2.90	1.04
	Post	0	0	8	21	6	3.94	
13. Determine the consequences of SRS in the classroom.	Pre	2	18	17	11	0	2.66	1.16
	Post	0	2	7	21	5	3.82	
14. Determine several courses of action to "cure" SRS in the classroom.	Pre	7	15	19	8	1	2.65	.95
	Post	0	2	12	19	2	3.60	
15. Present a defensible rationale for eliminating SRS in the classroom.	Pre	2	17	17	14	0	2.62	.98
	Post	0	3	11	18	3	3.60	
						Pre-test Average	2.80	.71
						Post-test Average	3.51	

n = Pre-test - 50
Post-test - 35

SCALE EXPLANATION

1. Poor
2. Average
3. Good
4. Very Good
5. Superior

zation. Eighty-six percent felt pre-service teachers should definitely be taught about subtle stereotyping forms.

When asked if they felt they had received enough exposure and information on stereotyping in general and asked if they wanted more, fifty-one percent said they had received enough exposure to general forms, while forty-nine percent replied they had not. Sixty-six percent wanted more information; thirty-four percent said they didn't.

When asked if they felt they had received enough exposure and information on sex-role stereotyping and asked if they wanted more, sixty-nine percent felt they had received enough specific information, while thirty-one percent said they had not. Forty-three percent wanted additional instruction; fifty-seven percent did not.

The evaluation items designed to elicit responses regarding perceived value gained from information presented in the two classes produced generalized statements regarding most and least valuable information. Students felt that in the following six areas they gained most value from the two class room sessions:

1. Increased awareness and sensitivity, in general, regarding stereotyping.
2. Increased ability to see others' perspectives.
3. Increased ability to identify the subtle forms of sex-role stereotyping which occur in educational settings.
4. Increased understanding of the causes and consequences of stereotyping and ways for controlling it.
5. Increased realization that the tendency to stereotype can be changed and/or controlled with educational exposure.
6. Surprise at the ease with which stereotypes can unknowingly be perpetuated.

When responding regarding the least valuable information learned, students reiterated two major themes: they felt strong personal reactions to the detailed statistics used to present sex-role stereotyping information and several felt they were already aware of the more generalized stereotyping forms, as well as the blatant sex-role stereotyping forms. Of particular interest here is the latter theme. In essence, these students are strongly stating that the value for them was in the subtle means of sex-role stereotyping. It should be noted that sixteen of the thirty-five responses did not contain a "least valuable" statement.

When asked about past experiences involving sex-role socialization, a broad range of experiences emerged, as expected. A large portion of the responses fell under the umbrella of curriculum/coursework. Specific examples included forced choices that placed boys and girls in traditional classes (i.e, girls in home economics courses and boys in vocational education classes), lack of athletic opportunities for women, and club activities and school offices prescribed by sex. In terms of career choices, counseling experiences were cited as limiting and tracking, and in many instances, nonexistent. Childhood reflections promoted statements regarding segregated play activities and spaces, toys, clothing choices, and task-role discrimination. Many students expressed resentments of exposure to stereotyped role-models and perpetuated beliefs about the "proper" boy/girl behavior traits.

Issues that arose as a result of the class work ranged from generalities to specifics. In general, the need to realize personal biases surfaced

as an issue related to future concerns. Concerns about "how to handle differences while still maintaining equality in the classroom emerged. The question of whether or not stereotyping can ever be eliminated was raised and liked to the consideration that an examination of the positive aspects of stereotyping, as well as the negative, should be undertaken. Other reactions raised included feelings of anger, resentment, and thoughtfulness towards the sex-role stereotyping that has socialized individuals, the desire to examine male sex-role stereotyping, and the notion that some people cannot and do not desire a narrow focus on sex-role stereotyping education.

Discussion of Data Results

This pilot study was conducted to guage the need for teaching preservice and service teachers about stereotyping, and to see whether a more general or a more specific approach towards presenting information on the subject would be most effective. The general approach concentrated on information that covered a broad range of stereotyping forms. The idea was to give an overview, or survey, of the subject. The second approach concentrated on one form of stereotyping, that of the sex-role socialization processes, and had depth rather than breadth as its objective. Based on the data received, what can be said?

With the wealth of information that already exists about stereotyping, it was not intended that this study would provide additional, new knowledge on the subject. Rather, it seemed more profitable at this point in time to pause and assess what actually is being done about the

subject as it relates to teacher training. Since Utah teachers are required to take this, or a similar, course, what method for teaching would best meet the needs of the students? Negative responses take on meaning, if improvement of instruction is the issue. Therefore, some attention is paid to those replies in the following discussion.

The high percentage of positive responses towards the overall value of the classes (80%) indicate that these classes did add to the students' fund of knowledge and understanding of stereotyping. The remaining replies (20%), which were less enthusiastic, when coupled with the subjective evaluations, indicated that although students felt the information to be basic and necessary, that it was redundant or repetitive. Responses included such statements as, "Sometimes the boy/girl stereotyping gets so nit-picky it's a pain," and "There is nothing new. The subject has been re-hashed over and over again." This dissent was even more apparant in the close range of responses recorded in the question that asked if students felt they had received enough information on general forms of stereotyping (51% yes, 49% no). After receiving specific data on sex-role stereotyping, an even larger number replied they had had enough (69%). The fact that fifty-seven percent of the students said they did not want any more instruction in sex-role stereotyping seems to indicate two possibilities. First, it could be that the method of dealing with one stereotype at a time allows for enough exposure, even if the time is limited to one or two class sessions. Or it could be that students have received enough information on that subject in other ways, so that direct teaching for longer

periods is no longer necessary.

Opposing statements can give no real clue as to which is the prevailing assumption because the sample size was small. Furthermore, there was a wide range of comments that indicated both positive and negative reactions toward more exposure to all forms of stereotyping, and in particular, sex-role stereotyping. For example, one student replied "I would like more [instruction] - there are many, many. I'm interested in socio-economic status values...," whereas another student replied, "I've had enough. Please stop assuming we are so naive." One student felt very positive about the experience, exclaiming, "No, not enough! I think more racial and ethnic exposure is needed." Another indicated she "would like to learn about stereotypes based on religion." Another student replied, "in every class I have I'm being made aware of stereotyping," and another replied "I am aware and conscious of prejudice and discrimination...these classes are only a reinforcement." One student went so far as to state, "I would like more from a healthier perspective. Perhaps more solutions posed."

Student replies to the question addressing the most valuable information learned reflected feelings that an increased awareness of and sensitivity to stereotypical issues would help them personally and professionally. Replies indicated that such knowledge would affect teaching philosophy and style. For example, one student replied, "In our task as teachers we ought to be aware of different ways and levels we affect students. Any way we can improve their emotional, intellectual, and

social sense of self worth will guide them for life...." Another student indicated, "I'll be more aware of what feedback I give to male and female students, in particular." And another indicated, "I will try to be more aware of stereotyping and try to eliminate any negative effects because of it." One student summed his feelings up by stating, "People are people and should be judged accordingly."

Negative reactions of some students towards the sex-role stereotyping information were apparent in the replies to two questions: "Do you feel you had enough exposure to sex-role stereotyping?" and "What was the least useful thing you learned from these two sessions?" One student replied, "This is a topic I resist because of my traditional upbringing." Another replied, "I feel that sexism is an issue that is in danger of being being beaten to death in the University classrooms." Another replied, "I feel this issue is really being pushed today," and another stated, "There was too much time spent on sex-role stereotyping."

Such comments indicate that of all the types of stereotyping reviewed in the study, sex-role stereotyping has received more attention than others. The examples of subtle forms of sexism aroused comments that showed surprise, anger, and boredom. The range of replies indicate that although specific examples are needed for clarity, less time can be spent on this form of stereotyping. Fewer examples would have sufficed, as long as the examples chosen illustrated the various subtle forms.

One caveat is in order. The reaction of these students to sex-role stereotyping information may not be indicative of most students. Again, a larger sample size might reveal a greater or lesser need for such in-

depth information. However, one factor must be considered. Utah has a dominant culture and religion which tends to stress the importance of womens' traditional roles. Therefore, many students who enter into university classroom discussions of sex-role socialization processes may possess a strong set of personal, pre-established values as a member of that culture. Further, non-members are also aware of the dominant culture and its belief system. The value of sex-role stereotyping education in Utah would be to show how teachers can avoid the more subtle forms by monitoring their own responses in public school classrooms.

The data did indicate that students felt all teachers, K - 12, as well as all pre-service teachers, should educate themselves and their students to issues of stereotyping. The need exists, evidently, judging from the evidence from these classes, but the question remains, how or what is the best way to educate pre-service teachers? The discussion summary offers a suggestion.

Discussion Summary

The two main purposes of this pilot study were to assess the need for teaching pre-service teachers about stereotypes and to determine if a more general or more specific approach would be most effective. The data show that the need exists, but at a different level than first assumed. The way information is presented will become more important in the future for two reasons. First, students are now at a higher level of awareness on most of the common forms of stereotyping. This may be due to public media coverage and to the increased attention paid to the subject in other

university teacher training courses (i.e., reading, social studies, science). Second, certain geographical areas may represent dominant cultures which defend traditional role models, beliefs, and value systems. If this is the case, as it is in Utah, issues involving sex-role stereotyping will find a certain amount of resistance. Of the two approaches used in this study, the more in-depth approach seemed most useful. Since students start on a higher level of awareness, it will be more beneficial to take issues that have already been identified, probe deeper into their causes and reasons for perpetuation, then help students to analyze and problem-solve for solutions to classroom situations. Areas pertaining to ethnicity, socio-economic and religious stereotypes were concerns for this particular population. A more in-depth approach to these issues would contribute much to the development of a more globally educated pre-service teacher.

Conclusions and Recommendations

If indeed, sex-role stereotyping techniques are acting as "critical filters," precluding girls' choice options in high school course selection (particularly mathematics and science), which later serves to preclude them from career choices, then education regarding these techniques is of utmost importance and essential. Drs. Myra and David Sadker recommend that this education be moved to the mainstream of teacher training education course-work as a means of minimizing these perpetuated techniques in the schools.

Based on the results of this pilot study, we suggest as our recommendations, the following three-based, or "home-run approach" to a reorganization of methodology to insure pre-service teachers are receiving the optimal level of benefit in regards to sex-role stereotyping education:

1) It can most likely be assumed that a much greater level of sex-role stereotyping awareness exists in students due to media coverage, as well as the fact that the issue is being covered in other courses. However, not discounting the fact that some geographic areas may not be as exposed as others, we recommend that sex-role information, the content, be relegated to the specific methodology teacher training courses, i.e., science methods, English methods, etc. Since these are some of the first courses taken by pre-service teachers, the in-depth specific content, as it relates to sex-role stereotyping, can and should be covered here.

2) In the course in which we conducted our study, Teaching Minority Students, we recommend that the focus be shifted to include global issues of stereotyping, including those of socio-economic, religious, etc. Rather than any in-depth study of any one specific issue, an assessment should be made of the needs of the class prior to instruction. Based on the needs of the class as they relate to the geographic area, the culture, and any previous instruction, focus of the class should follow these needs.

3) Obviously, as in the 1982 validation study conducted by the Sadkers, teachers are being exposed to sex-role stereotyping techniques and the need for its eradication. Yet this awareness is having little, if any, effect in the classroom. Teachers state that they are carefully monitoring their presentations to eliminate sex-role stereotyping. Yet when videotaped in the classroom, these teachers discover that despite their best intentions, their behavior continues to mirror the same

old practices. For this reason, we recommend that in the education methodology courses, that specific techniques for altering teacher behavior, hence student response to that behavior, be presented and practiced until they are second nature, until they are ingrained as unconscious, effective teaching practices, which override the unconscious, ineffective teaching practices. Until this final step is taken, it is very likely that dissolution of sex-role stereotyping techniques will remain in the periphery, and teachers will continue to mirror society's women-negating attitudes, and our girl-children can thank their teachers for their narrow, selected choices in life.

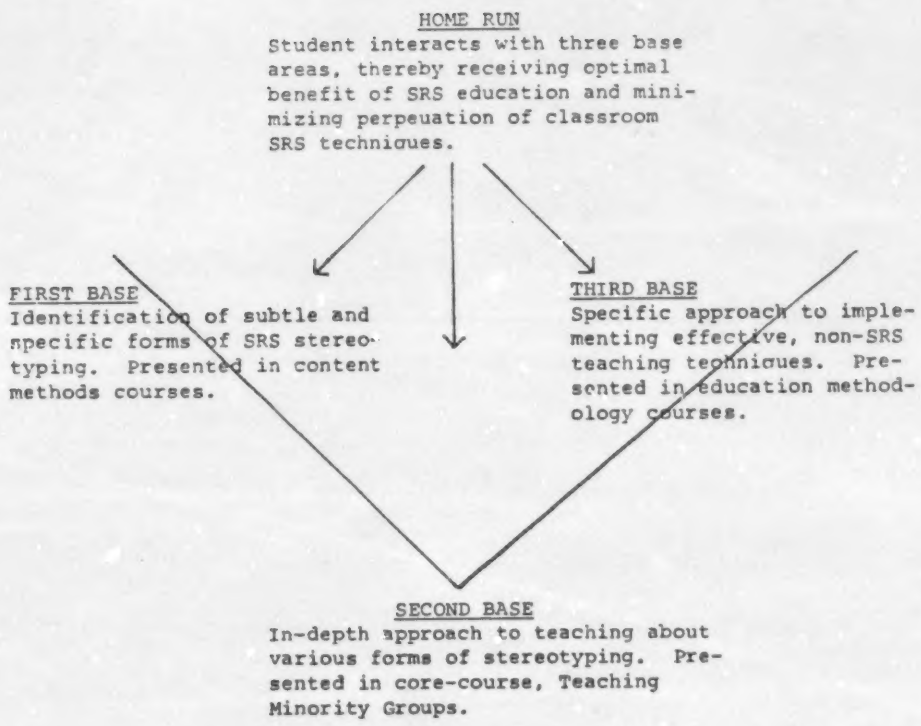
Future Research

It is the feeling of the researchers that future study be directed towards identifying and developing specific teaching techniques that will counter the stereotyping practices which currently exist. The Sadkers, for example, suggest questionning "wait-times" and classroom arrangement as possible alternatives. Once these techniques are identified, developed, and implemented, their effects on the future of our children can be assessed.

TABLE 3

THE "HOME RUN" APPROACH:
EFFECTIVE TEACHER TRAINING FOR SRS STEREOTYPE ISSUES

-A THREE BASED MODEL-


HOME RUN
Student interacts with three base areas, thereby receiving optimal benefit of SRS education and minimizing perpeuation of classroom SRS techniques.
FIRST BASE
Identification of subtle and specific forms of SRS stereotyping. Presented in content methods courses.
THIRD BASE
Specific approach to implementing effective, non-SRS teaching techniques. Presented in education methodology courses.
SECOND BASE
In-depth approach to teaching about various forms of stereotyping. Presented in core-course, Teaching Minority Groups.

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APPENDIX:

INSTRUMENTS USED

INSTRUCTOR_____ DATE_____ QTR_____ PRE_____ POST_____

SEX: M___ F_____ AGE: 20-29_____ 30-39_____ 40-49_____ Over 50_____ 28

CHECK ONE:

_____PRE-SERVICE TEACHER
_____CONTEMPLATING TEACHING: NOT IN A PROGRAM
_____TEACHER IN THE FIELD
_____SCHOOL ADMINISTRATOR
_____OTHER: PLEASE EXPLAIN

_____

SCALE EXPLANATION

1. Poor
2. Average
3. Good
4. Very good
5. Superior

I AM ABLE TO:	POOR				SUPERIOR
1. Explain the concept of stereotyping.	1	2	3	4	5
2. Distinguish among stereotyping, halo effect, projection, expectancy, and prejudice.	1	2	3	4	5
3. Present a defensible rationale for stereotyping.	1	2	3	4	5
4. Identify three major causes of stereotyping.	1	2	3	4	5
5. Identify and consider several consequences of stereotyping.	1	2	3	4	5
6. Distinguish when stereotyping becomes dangerous.	1	2	3	4	5
7. Determine several courses of action to "cure" the practice of negative stereotyping.	1	2	3	4	5
8. Recognize sexist attitudes and behaviors.	1	2	3	4	5
9. Understand the concept of sex-role stereotyping.	1	2	3	4	5
10. Identify 5 blatant means of perpetuating SRS in the classroom.	1	2	3	4	5
11. Identify at least 10 subtle means of SRS in the classroom.	1	2	3	4	5
12. Clarify my own thinking about SRS in the classroom.	1	2	3	4	5
13. Determine the consequences of SRS in the classroom.	1	2	3	4	5
14. Determine several courses of action to "cure" SRS in the classroom.	1	2	3	4	5
15. Present a defensible rationale for eliminating SRS in the classroom.	1	2	3	4	5

Instructor_____ Date_____ 29

EVALUATION

Please mark the correct space.

Sex ___M ____F

Age ___20-29 ____30-39 ____40-49 _____School Administrator

___PreService teacher _____Other. Please explain

___Contemplating teaching in the future; not currently in a program. _____

___Teacher already in the field.

Please respond freely to the following:

1. Rate the overall value of the classes on stereotyping.

1st Class: _____ 2nd Class: _____ Combined Classes: _____

SCALE: 1 2 3 4 5 6 7 8 9 10
Low High

2. Did these classes contribute to your understanding about stereotyping?

Why or Why not?

3. What was the most valuable thing you learned from these two sessions?

4. What was the least useful thing you learned from these two sessions?

5. Do you see this information as having an influence on your behavior in the future?
How so?

6. What did these classes bring to the surface for you?
(emotions, questions, biases etc.)

30

7. During your K-12 years, were there any experiences you encountered that could be identified as sex-role socialization?

   Please describe.

8. Do you feel the subtle forms of sex-role socialization to be an important body of knowledge for students (k-12) to be made aware of?

   Why or why not.

9. Do you feel the subtle forms of sex-role socialization to be an important body of knowledge of which teachers (k-12) should be made aware?

   Why or why not?

10. Do you feel this information should be taught to all pre-service teachers?

    Why or why not?

11. Do you feel that you had enough exposure to the various stereotypes?

    Would you like more?

12. Do you feel you had enough exposure to sex role stereotyping?

    Would you like more?